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EXAMINER
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SELBY, GEVELL V

ART UNIT	PAPER NUMBER
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2615

DATE MAILED: 02/10/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

### Application No.

09/666,449

### Applicant(s)

YOKONUMA, NORIKAZU

### Examiner

Gevell Selby

### Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 21 September 2000 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's arguments with respect to claims 1-20 have been considered but are moot in view of the new ground(s) of rejection.

### ***Specification***

2. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

### ***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claim 19 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

5. Claim 19 recites the limitation "said second" in lines 19. There is insufficient antecedent basis for this limitation in the claim.

The claim does not complete the statement referencing the second of a previous subject matter. For examination purposes, the terms "with said second" will be omitted from the claim.

***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. **Claim 20 is rejected under 35 U.S.C. 102(b) as being anticipated by Suzuki, US 5,502,485.**

In regard to claim 20, Suzuki, US 5,502,485, discloses an electronic camera (see figure 1), comprising:

a charge storage type image-capturing element (see figure 1, element 105) that stores electrical charges in correspondence to subject brightness distribution (see column 3, lines 59-62);

a buffer memory unit (see figure 1, element 108) that stores said image data read out by said image-capturing element (see column 4, lines 5-7);

a single shot/continuous shooting setting unit (see figure 1, element <sup>109</sup>~~9~~) that sets either a single shot mode or a continuous shooting mode (see column 8, lines 15-26); and

a recording signal output circuit (see figure 1, element 109) that repeatedly stores electrical charges at said image-capturing element and reads out image data from said image-capturing element when said continuous shooting mode has been set by said single shot/continuous shooting setting unit (see column 4, lines 5-9) and compresses and outputs image data corresponding to a frame read out

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immediately before while electrical charges are being stored for the next frame  
(see column 8, lines 8-15).

***Claim Rejections - 35 USC § 103***

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. **Claims 1, 2, and 12-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over view of Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999.**

In regard to claim 1, Suzuki, US 5,502,485, discloses an electronic still camera  
(see figure 1) comprising:

a charge storage type image-capturing element (see figure 1, element 105)  
that stores electrical charges in correspondence to subject brightness distribution  
and reads out image data corresponding to said electrical charges(see column 3,  
lines 59-62);

a buffer memory unit (see figure 1, element 108) that stores said image  
data read out by said image-capturing element (see column 4, lines 5-7);

continuous shooting setting unit (see figure 1, element 109 and column 4,  
lines 10-11);

a recording signal output circuit (see figure 1, element 109) that repeatedly  
stores electrical charges at said image-capturing element and reads out image data

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from said image-capturing element when continuous shooting mode has been set by said continuous shooting setting unit and compresses and outputs image data corresponding to a frame which has been read out immediately before while electrical charges for the next frame are being stored during, at least, a period of time in which said continuous shooting mode has been set (see column 4, lines 5-9 and column 8, lines 8-15).

The Suzuki reference does not disclose a continuous shooting setting unit that sets either a first continuous shooting mode or a second continuous shooting mode in which photographs are taken over shorter intervals than in said first continuous shooting mode.

Miyamoto, US 6,518,999, discloses a continuous shooting setting unit (see figure 1, element 14) that sets either a first continuous shooting mode (high-speed continuous shooting mode) or a second continuous shooting mode (extremely-high-speed continuous shooting mode) in which photographs are taken over shorter intervals than in said first continuous shooting mode (see column 3, lines 50-67). High-speed continuous shooting is accomplished by thinning out the horizontal lines of the image sensor during readout (see column 2, lines 9-22)

It would have been obvious to one of ordinary skill in the art at the time of invention to have been motivated to modify Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, to have a continuous shooting setting unit that sets either a first continuous shooting mode or a second continuous shooting mode in which photographs are taken over shorter intervals than in said first continuous shooting mode in order to reproduce the motion of a subject as a flash motion.

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In regard to claim 2, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses an electronic still camera according to claim 1, wherein:

said image-capturing element is provided with a plurality of pixels (It is inherent the solid state imaging device had a plurality on pixels in order to capture an image);

and said recording signal output circuit reads out image data only from some of the pixels at said image-capturing element while said second continuous shooting mode has been set (see Miyamoto: column 2, lines 9-22).

In regard to claims 12 and 13, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses an electronic still camera according to claims 1 and 2, respectively, wherein:

when said second continuous shooting mode has been set, a shutter speed corresponding to a continuous shooting speed is set at a lower speed limit.

It is implied that the shutter speed for the second (extremely-high-speed) continuous shooting mode has a minimum speed to differentiate it from the first (high-speed) continuous shooting mode and in order to be able to function under the shorter interval time between image captures.

**10. Claims 3, 4, 8-11, 14-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, as applied to claim 2 above, and further in view of Kudo et al., US 5,517,243.**

In regard to claim 3, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses an electronic still camera according to claim 1. The Suzuki and Miyamoto references do not disclose wherein:

when said second continuous shooting mode has been set, an image-capturing sensitivity higher than an image capturing sensitivity for said first continuous shooting mode has been set.

Kudo et al., US 5,517,243, teaches to increase the image-capturing sensitivity as the image capturing rate increases by disclosing an electronic camera in which the image-capturing sensitivity is higher when image are captured in succession, in continuous mode, than in single shot mode (see figure 13, steps S113-116 and column 17, lines 40-50).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, and further in view of Kudo et al., US 5,517,243, wherein when said second continuous shooting mode has been set, an image-capturing sensitivity higher than an image capturing sensitivity for said first continuous shooting mode has been set in order to provide an electronic camera which is arrange to prevent deterioration of image quality when pictures are taken at higher speeds.

In regard to claim 4, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses the electronic still camera of claim 2 as described above. The Suzuki and Miyamoto references do not disclose that when said second continuous shooting mode



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has been set, an image-capturing sensitivity higher than an image capturing sensitivity for said first continuous shooting mode has been set.

Kudo et al., US 5,517,243, teaches to increase the image-capturing sensitivity as the image capturing rate increases by disclosing an electronic camera in which the image-capturing sensitivity is higher when image are captured in succession, in continuous mode, than in single shot mode (see figure 13, steps S113-116 and column 17, lines 40-50).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, in further view of Kudo et al., US 5,517,243, wherein when said second continuous shooting mode has been set, an image-capturing sensitivity higher than an image capturing sensitivity for said first continuous shooting mode has been set to prevent deterioration of image quality as suggested by Kudo, US 5,517,243 (see column 3, lines 5-10).

In regard to claims 8, 10, and 11, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses an electronic still camera according to claims 1, 3, and 5, respectively. The Suzuki and Miyamoto references do not disclose:

a mechanical shutter provided to block photographic, light fluxes traveling to said image-capturing element, wherein:

when said second continuous shooting mode has been set, electrical charges are stored at said image-capturing element and image data are read out from said image-capturing element while said mechanical shutter is left open.

Kudo et al., US 5,517,243, discloses an electronic camera comprising:

a mechanical shutter (see figure 2, element 11) provided to block photographic, light fluxes traveling to said image-capturing element (see column 4, line 55), wherein:

when said second continuous shooting mode has been set, electrical charges are stored at said image-capturing element and image data are read out from said image-capturing element while said mechanical shutter is left open (see column 1, lines 39-42 and column 18, lines 49-60).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, and further in view of Kudo et al., US 5,517,243, to have the mechanical shutter described above in order to prevent unwanted exposure to the CCD.

In regard to claim 9, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses the electronic still camera of claim 2 as described above. The Suzuki and Miyamoto references do not disclose:

a mechanical shutter provided to block photographic, light fluxes traveling to said image-capturing element, wherein:

when said second continuous shooting mode has been set, electrical charges are stored at said image-capturing element and image data are read out from said image-capturing element while said mechanical shutter is left open.

Kudo et al., US 5,517,243, discloses an electronic camera comprising:

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a mechanical shutter (see figure 2, 11) provided to block photographic, light fluxes traveling to said image-capturing element (see column 4, line 55), wherein:

when said second continuous shooting mode has been set, electrical charges are stored at said image-capturing element and image data are read out from said image-capturing element while said mechanical shutter is left open (see column 1, lines 39-42 and column 18, lines 49-60).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, in further view of Kudo et al., US 5,517,243, to have the mechanical shutter described above in order to protect the image sensor from overexposure.

In regard to claims 14-16, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, and further in view of Kudo et al., US 5,517,243, discloses an electronic still camera according to claims, 3, 5, and 8, respectively, wherein:

when said second continuous shooting mode has been set, a shutter speed corresponding to a continuous shooting speed is set at a lower speed limit.

It would have been implied that the shutter speed for the second (extremely high-speed) continuous shooting mode has a minimum speed to differentiate it from the first (high-speed) continuous shooting mode and in order to be able to function under the shorter interval time between image captures.

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**11. Claims 5-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, as applied to claims 1 and 3 above, and further in view of Mizoguchi et al., US 5,959,669.**

In regard to claims 5-7, Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, discloses an electronic still camera according to claims 1, 2, and 3, respectively. The Suzuki and Miyamoto references do not disclose comprising:

an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart, with said second continuous shooting mode program chart shifted toward a higher shutter speed side relative to said first continuous shooting mode program chart.

Mizoguchi et al., 5,959,669, discloses an electronic still camera comprising:

an exposure value setting unit (see figure 21, element 108) that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart (see figure 35 and column 26, lines 40-51), wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart (see figure 25, step 110: there is a chart for color standard-resolution continuous shooting) and a second continuous shooting mode

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program chart (see figure 25, step 119: there is a second chart for black-and-white high-resolution continuous shooting).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Suzuki, US 5,502,485, in view of Miyamoto, US 6,518,999, and further in view of Mizoguchi et al., US 5,959,669, to have:

an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart, with said second continuous shooting mode program chart shifted toward a higher shutter speed side relative to said first continuous shooting mode program chart in order to obtain the aperture value and shutter speed required quickly to decreasing processing time.

**12. Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, and Kudo et al., US 5,517,243.**

In regard to claim 17, Ogino, US 5,633,976, discloses an electronic still camera (see figure 1) comprising:

a charge storage type image-capturing element (see figure 1, element 14) that stores electrical charges in correspondence to subject brightness distribution (see column 2, line 1 to column 3, line 2);

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a continuous shooting setting unit (see figure 1, element 38) that sets either a first continuous shooting mode (low speed) or a second continuous shooting mode (high speed) in which photographs are taken over shorter intervals than in said first continuous shooting mode (see column 7, lines 59-63); and

a recording signal output circuit (see figure 1, element 20) that repeatedly stores electrical charges at said image-capturing element and reads out image data from said image-capturing element when either continuous shooting mode has been set by said continuous shooting setting unit (see column 4, lines 27-31).

The Ogino reference does not disclose:

the recording signal output circuit reads out image data only from some of the pixels at said image-capturing elements while said second continuous shooting mode has been set.

Miyamoto, US 6,518,999, discloses high-speed continuous shooting is accomplished by thinning out the horizontal lines of the image sensor during readout (see column 2, lines 9-22)

It would have been obvious to one of ordinary skill in the art at the time of invention to have been motivated to modify Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, to have the recording signal output circuit read out image data only from some of the pixels at said image-capturing elements while said second continuous shooting mode has been set in order to reproduce the motion of a subject as a flash motion.

The Ogino and Miyamoto references do not disclose:

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a sensitivity setting unit that sets a higher image capturing sensitivity in said second continuous shooting mode than an image-capturing sensitivity set in said first continuous shooting mode.

Kudo et al., US 5,517,243, teaches to increase the image-capturing sensitivity as the image capturing rate increases by disclosing an electronic camera in which the image-capturing sensitivity is higher when image are captured in succession, in continuous mode, than in single shot mode (see figure 13, steps S113-116 and column 17, lines 40-50).

It would have been obvious to a person skilled in the art, at the time of invention, to have been motivated modify Ogino, US 5,633,976, in view of Kudo et al., US 5,517,243, to have:

a sensitivity setting unit that sets a higher image capturing sensitivity in said second continuous shooting mode than an image-capturing sensitivity set in said first continuous shooting mode, in order to prevent deterioration of image quality as suggested by Kudo, US 5,517,243 (see column 3, lines 5-10).

**13. Claim 18 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, and Mizoguchi et al., 5,959,669.**

In regard to claim 18, Ogino, US 5,633,976, discloses an electronic still camera (see figure 1) comprising:

a charge storage type image-capturing element (see figure 1, element 14) that stores electrical charges in correspondence to subject brightness distribution (see column 4, lines 2-9);

[The brightness distribution of the subject is focused by the lens through the light amount control member onto the image pickup face which converts the optical image into an electrical signal that is stored in the sample holding circuit.]

a continuous shooting setting unit (see figure 1, element 38) that sets either a first continuous shooting mode (low speed) or a second continuous shooting mode (high speed) in which photographs are taken over shorter intervals than in said first continuous shooting mode (see column 7, lines 59-63); and

a recording signal output circuit (see figure 1, element 20) that repeatedly stores electrical charges at said image-capturing element and reads out image data from said image-capturing element when either continuous shooting mode has been set by said continuous shooting setting unit (see column 4, lines 27-31).

The Ogino reference does not disclose:

the recording signal output circuit reads out image data only from some of the pixels at said image-capturing elements while said second continuous shooting mode has been set.

Miyamoto, US 6,518,999, discloses high-speed continuous shooting is accomplished by thinning out the horizontal lines of the image sensor during readout (see column 2, lines 9-22)

It would have been obvious to one of ordinary skill in the art at the time of invention to have been motivated to modify Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, to have the recording signal output circuit read out image data only from some of the pixels at said image-capturing elements while said second continuous



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shooting mode has been set in order to reproduce the motion of a subject as a flash motion.

The Ogino and Miyamoto references do not disclose comprising:

an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart, with said second continuous shooting mode program chart shifted toward a higher shutter speed side relative to said first continuous shooting mode program chart.

Mizoguchi et al., 5,959,669, discloses an electronic still camera comprising:

an exposure value setting unit (see figure 21, element 108) that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart (see figure 35 and column 26, lines 40-51), wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart (see figure 25, step 110: there is a chart for color standard-resolution continuous shooting) and a second continuous shooting mode program chart (see figure 25, step 119: there is a second chart for black-and-white high-resolution continuous shooting).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Ogino, US 5,633,976, in view of Mizoguchi et al., US 5,959,669 to have:

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an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart, with said second continuous shooting mode program chart shifted toward a higher shutter speed side relative to said first continuous shooting mode program chart in order to obtain the aperture value and shutter speed required quickly to decreasing processing time.

**14. Claim 19 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, Kudo et al., US 5,517,243, and Mizoguchi et al., US 5,959,669.**

In regard to claim 19, Ogino, US 5,633,976, discloses an electronic still camera (see figure 1) comprising:

a charge storage type image-capturing element (see figure 1, element 14) that stores electrical charges in correspondence to subject brightness distribution (see column 4, lines 2-9);

[The brightness distribution of the subject is focused by the lens through the light amount control member onto the image pickup face which converts the optical image into an electrical signal that is stored in the sample holding circuit]

a continuous shooting setting unit (see figure 1, element 38) that sets either a first continuous shooting mode (low speed) or a second continuous

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shooting mode (high speed) in which photographs are taken over shorter intervals than in said first continuous shooting mode (see column 7, lines 59-63); and

a recording signal output circuit (see figure 1, element 20) that repeatedly stores electrical charges at said image-capturing element and reads out image data from said image-capturing element when either continuous shooting mode has been set by said continuous shooting setting unit (see column 4, lines 27-31).

The Ogino reference does not disclose:

the recording signal output circuit reads out image data only from some of the pixels at said image-capturing elements while said second continuous shooting mode has been set.

Miyamoto, US 6,518,999, discloses high-speed continuous shooting is accomplished by thinning out the horizontal lines of the image sensor during readout (see column 2, lines 9-22)

It would have been obvious to one of ordinary skill in the art at the time of invention to have been motivated to modify Ogino, US 5,633,976, in view of Miyamoto, US 6,518,999, to have the recording signal output circuit read out image data only from some of the pixels at said image-capturing elements while said second continuous shooting mode has been set in order to reproduce the motion of a subject as a flash motion.

The Ogino and Miyamoto references do not disclose comprising:

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a sensitivity setting unit that sets a higher image capturing sensitivity in said second continuous shooting mode than an image-capturing sensitivity set in said first continuous shooting mode; and

Kudo et al., US 5,517,243, teaches to increase the image-capturing sensitivity as the image capturing rate increases by disclosing an electronic camera in which the image-capturing sensitivity is higher when image are captured in succession, in continuous mode, than in single shot mode (see figure 13, steps S113-116 and column 17, lines 40-50).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Ogino, US 5,633,976, in view of Kudo et al., US 5,517,243, to have:

a sensitivity setting unit to prevent deterioration of image quality as suggested by Kudo, US 5,517,243 (see column 3, lines 5-10).

The Ogino and Kudo references doe not disclose:

an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart. ~~with said second.~~

Mizoguchi et al., 5,959,669, discloses an electronic still camera comprising:

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an exposure value setting unit (see figure 21, element 108) that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart (see figure 35 and column 26, lines 40-51), wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart (see figure 25, step 110: there is a chart for color standard-resolution continuous shooting) and a second continuous shooting mode program chart (see figure 25, step 119: there is a second chart for black-and-white high-resolution continuous shooting).

It would have been obvious to a person skilled in the art, at the time of invention, to modify Ogino, US 5,633,976, in view of Kudo et al., US 5,517,243, and Mizoguchi et al., US 5,959,669, to have:

an exposure value setting unit that sets shutter speed and aperture corresponding to subject brightness in conformance to a predetermined program chart, wherein:

said exposure value setting unit is provided with a first continuous shooting mode program chart and a second continuous shooting mode program chart, with said second continuous shooting mode program chart shifted toward a higher shutter speed side relative to said first continuous shooting mode program chart in order to obtain the aperture value and shutter speed required quickly to decreasing processing time.

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***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Gevell Selby whose telephone number is 703-305-8623. The examiner can normally be reached on 8:00 A.M. - 5:30 PM (every other Friday off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's acting supervisor, Thai Tran can be reached on 703-305-4725. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

gvs

  
TUAN HO  
PRIMARY EXAMINER